5



## **CLAIMS**

- 1. A gas sampler for a portable gas analyser, comprising an integral cooler through which a gas sample is adapted to pass prior to being conveyed to a gas analyser, wherein said cooler is operable by means other than electrical power.
- 2. A sampler as claimed in Claim 1, is provided with an industry-standard sample probe.
- 3. A sampler as claimed in Claim 1, is provided with a connection for a hose for transfer of said gas sample from said sampler to a gas analyser.
- 4. A sampler as claimed in Claim 1, wherein said cooler comprises a vessel adapted to contain a cooling agent to remove heat from said gas sample.
- 15 S. A sampler as claimed in Claim 4, wherein said cooling agent is a measure of crystals to which water is then added to initiate an endothermic chemical reaction.
  - 6. A sampler as claimed in Claim 5, wherein said crystals are of ammonium nitrate.
- 7. A sampler as claimed in Claim 5, wherein said crystals are of potassium bromide.
  - 8. A sampler as claimed in Claim 5, wherein said crystals and water are supplied as a package, with said water in a user-rupturable bag.

5

- 9. A sampler as claimed in Claim 4, wherein said vessel also houses an impinger, having an inlet aperture, and an outlet aperture for said gas sample, and said impinger is subjected to the cooling effect of said cooler, whereby sufficient heat is removed from said gas sample flowing through said cooler to attain the dew point of said gas sample.
- 10. A sampler as claimed in Claim 9, wherein a catch pot is associated with said impinger to collect water that is condensed out of said gas sample.
- 11. A sampler as claimed Claim 2, wherein said probe is interchangeable, to provide for a variety of probe lengths.
- 12. A portable gas analyser provided with a gas sampler as defined in Claim 1.